

WHAT IS CLAIMED IS:

1. For use by a read/write machine, a method for assigning
2 a unique label to a storage medium, the method comprising:

- 3 a) determining whether or not the storage medium has
4 been considered before;
- 5 b) if the storage medium has not been considered
6 before, then
 - 7 (i) determining a unique label identifier,
 - 8 (ii) determining a unique volume label,
 - 9 (iii) writing the unique volume label onto the
10 storage medium, and
 - 11 (iv) providing a command to generate a label
12 based on the unique label identifier, the label
13 to be associated with the storage medium; and
 - 14 c) updating a database based on files added to or
15 deleted from the storage medium.

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1 2. The method of claim 1 further comprising:

2 d) synchronizing the database with a database on a
3 device apart from the read/write machine.

1 3. The method of claim 2 wherein the read/write machine is
2 a personal computer and the device is a handheld device.

1 4. The method of claim 3 wherein the device is an
2 untethered handheld device.

1 5. The method of claim 1 wherein the read/write machine is
2 a computer with at least one of (a) a floppy disk drive,
3 (b) a CD ROM drive, (c) a ZIP drive, and (d) a DVD drive.

1 6. The method of claim 1 wherein the label based on the
2 unique label identifier is a bar code label.

1 7. The method of claim 1 wherein the act of determining a
2 unique volume label is based, at least in part, on state
3 information accessible to the read/write machine.

1 8. The method of claim 7 wherein the state information is
2 a count sequence.

1 9. The method of claim 1 wherein the database includes
2 records, each record including a first field having a value
3 associated with the unique volume label, and a second field
4 having a value associated with a file stored on the storage
5 medium.

1 10. A method for determining the contents of a storage
2 medium without reading the storage medium, the method
3 comprising:

- 4 a) accepting information read from a label associated
5 with the storage medium;
- 6 b) converting the accepted information into a
7 database key;
- 8 c) requesting records from a database instance using
9 the database key;
- 10 d) accepting records in response to the request; and
- 11 e) rendering information about the accepted records.

1 11. The method of claim 10 wherein the label associated
2 with the storage medium is a bar code and wherein the

3 information read from the label is accepted from a bar code
4 scanner.

1 12. The method of claim 10 wherein the information about
2 the accepted records rendered includes file names.

1 13. The method of claim 12 wherein the accepted
2 information read from a label associated with the storage
3 medium is read by a handheld device, and the information
4 about the accepted records is rendered on the handheld
5 device.

1 14. The method of claim 13 wherein the read label is
2 converted into a database key by the handheld device, the
3 records are requested from a database instance using the
4 database key by the handheld device, and the records are
5 accepted in response to the request by the handheld device.

1 15. A method for matching file parameters with one or more
2 storage media, each of the one or more storage media having
3 an associated label, the method comprising:

- 4 a) accepting one or more search parameters;
- 5 b) generating a query based on the search parameters;
- 6 c) accepting one or more records returned in response
7 to the query generated;
- 8 d) rendering information associated with each of the
9 one or more records accepted, the information rendered
10 being related to the label associated with the storage
11 medium storing one or more files identified with the
12 one or more records accepted.

1 16. The method of claim 15 wherein the labels are
2 machine-readable labels, the method further comprising:
3 e) accepting information read from the
4 machine-readable labels;
5 f) if the accepted information read from the
6 machine-readable labels matches information associated
7 with any one of the one or more records accepted, then
8 generating a first indicator, said first indicator
9 able to be perceived by humans.

1 17. The method of claim 16 further comprising:
2 g) if the accepted information read from the
3 machine-readable labels does not match information
4 associated with any one of the one or more records
5 accepted, then generating a second indicator, said
6 second indicator able to be perceived by humans.

1 18. The method of claim 17 wherein the first indicator is
2 a first audible sound, and the second indicator is a second
3 audible sound.

1 19. The method of claim 15 wherein each of the labels
2 include human-readable part, and wherein the information
3 associated with each of the one or more records accepted
4 corresponds to the human-readable part of the labels.

1 20. An apparatus for assigning a unique label to a
2 removable storage medium, the apparatus comprising:
3 a) means for reading files from and/or writing files
4 to a removable storage medium;
5 b) means for generating a label;

6 c) means for determining whether or not the removable
7 storage medium has been considered before;
8 d) means, if the storage medium has not been
9 considered before, for
10 (i) determining a unique label identifier,
11 (ii) determining a unique volume label,
12 (iii) instructing the means for reading and/or
13 writing files to write the unique volume label
14 onto the storage medium, and
15 (iv) providing a command to generate a label
16 based on the unique label identifier, to the
17 means for generating a label; and
18 e) a database, wherein the database is updated based
19 on files added to or deleted from the removable
20 storage medium.

1 21. The apparatus of claim 20 further comprising:
2 f) means for synchronizing the database with a
3 database on a device apart from the apparatus.

1 22. The apparatus of claim 21 wherein the device is a
2 handheld device.

1 23. The apparatus of claim 21 wherein the device is an
2 untethered, handheld device.

1 24. The apparatus of claim 20 wherein the means for
2 reading files from and/or writing files to a removable
3 storage medium are at least one of (a) a floppy disk drive,
4 (b) a CD ROM drive, (c) a ZIP drive, and (d) a DVD drive.

1 25. The apparatus of claim 20 wherein the label is a bar
2 code label.

1 26. The apparatus of claim 20 further comprising:
2 f) state information, wherein the unique volume label
3 is determined, at least in part, based on the state
4 information.

1 27. The apparatus of claim 26 wherein the state
2 information is a count sequence.

1 28. The apparatus of claim 20 wherein the database
2 includes records, each record including a first field
3 having a value associated with the unique volume label, and
4 a second field having a value associated with a file stored
5 on the removable storage medium.

1 29. An apparatus for determining the contents of a storage
2 medium without reading the storage medium, the apparatus
3 comprising:

- 4 a) means for reading a label associated with the
5 storage medium;
- 6 b) means for accepting information read, by the means
7 for reading, from a label associated with the storage
8 medium;
- 9 c) means for converting the read label into a
10 database key;
- 11 d) means for requesting records from a database
12 instance using the database key;
- 13 e) means for accepting records in response to the
14 request; and

15 e) means for rendering information about the accepted
16 records.

1 30. The apparatus of claim 29 wherein the means for
2 reading is a bar code scanner, and wherein the label
3 associated with the storage medium is a bar code.

1 31. The apparatus of claim 29 wherein the information
2 about the accepted records rendered includes file names.

1 32. The apparatus of claim 29 wherein the means for
2 rendering is a display.

1 33. The apparatus of claim 29 further comprising:
2 f) the database.

1 34. The apparatus of claim 33 further comprising:
2 g) means for synchronizing the database with a
3 database maintained by a separate machine which
4 created the storage medium.

1 35. An apparatus for matching file parameters with one or
2 more storage media, each of the one or more storage media
3 having an associated label, the apparatus comprising:
4 a) a user input for accepting one or more search
5 parameters;
6 b) means for generating a query based on the accepted
7 one or more search parameters;
8 c) means for accepting one or more records returned
9 in response to the query generated;
10 d) means for rendering information associated with
11 each of the one or more records accepted, the

12 information rendered being related to the label
13 associated with the storage medium storing one or more
14 files identified with the one or more records
15 accepted.

1 36. The apparatus of claim 35 wherein the labels are
2 machine-readable labels, the apparatus further comprising:
3 e) a label reader for reading information read from
4 the machine-readable labels; and
5 f) an output means for generating a first indicator
6 able to be perceived by humans if the accepted
7 information read from the machine-readable labels
8 matches information associated with any one of the one
9 or more records accepted.

1 37. The apparatus of claim 36 wherein the output means
2 further generates a second indicator able to be perceived
3 by humans if the accepted information read from the
4 machine-readable labels does not match information
5 associated with any one of the one or more records
6 accepted.

1 38. The apparatus of claim 37 wherein the output means is
2 a speaker, wherein the first indicator is a first audible
3 sound, and wherein the second indicator is a second audible
4 sound.

1 39. The apparatus of claim 35 wherein each of the labels
2 include human-readable part, and wherein the information
3 associated with each of the one or more records accepted
4 corresponds to the human-readable part of the labels.